Math 112
LQuiz 08

2022–02–15 (T)

Your name: _____

Exercise

(4 pt) Show that the following limits equal $\frac{1}{2}$. (Before you use l'Hôpital's rule, show that it applies!)

(a) (2 pt) $\displaystyle\lim_{x\to 0} \frac{e^{2x}-1}{4x}$

(b) (2 pt) $\displaystyle\lim_{x\to 0} \frac{e^x - \cos x - x - x^2}{e^x - \sin x - 1 - \frac{1}{2}x^2}$